

# The Newsletter of the Francestown Land Trust, Inc.

**Spring 2020** 

# **Conserving Land Adds Economic Value to Francestown**

# Study shows \$11 return on every \$1 invested in NH land conservation.

As of March 2020, the FLT has protected, through conservation easements or actual land ownership, more than 2,779 acres in Francestown and surrounding towns.

Some people assume that conserving land results in an overall economic loss to a town. However, a comprehensive study, "New Hampshire's Return on Investment in Land Conservation," by the Trust for Public Land (TPL), turns this assumption on its head. In fact, conservation of land results in added economic value to New Hampshire towns.

The study is funded by the Doris

Duke Charitable Foundation and other national and regional organizations. Technical review of the methodology was provided by Richard Howarth, a Professor of Environmental Studies at Dartmouth College and Shannon Rogers, an Ecological Economist in the Center for the Environment at NH's Plymouth State University.

Long-time FLT Board member Barry Wicklow, Professor of Biology at Saint Anselm's College, has reviewed the study and finds it "accurate and reliable."

The TPL study demonstrates that every dollar invested in land conservation by New Hampshire state agencies returned \$11 of value in "natural goods and services" to communities. Privately sponsored land preservation, such as what FLT does, should have a similar effect. In Francestown, our gain in natural goods and services includes land preserved for wildlife habitat, agriculture, water sources, outdoor recreation and tourism, as well as timber harvesting. The New Hampshire study was published in 2013; a 2018 study by TPL in Vermont showed a \$9 return on each dollar invested.

Over the Winter of 2019-2020, FLT continued to preserve land parcels to provide our community with a positive return on investment. Four recent conservation projects exemplify the various ways in which our community benefits economically from land protection.



The south branch of the Piscataguog River at Cross Road.

# Wildlife Habitat and Water Source Protection

Two recent FLT projects help protect water quality and preserve the wildlife corridor along the South Branch of the Piscataquog River. These projects are part of the FLT's ongoing "Headwaters-South Branch Conservation Initiative," a strategic effort to protect and connect conserved parcels along the South Branch of the Piscataquog River and its tributaries.

The first project is Michael and Mary Murphy's Floodplain Conservation Easement, which protects 11 acres along east side of the South Branch south of Cross

Road. The second is Ron and Melissa Shattuck's sale to FLT of 10 acres on the west side of the South Branch north of Cross Road. (In the late 1700s and early 1800s this parcel was owned by Oliver Holmes and his descendants.)

Both of these properties are what the TPL study describes as "natural lands and water bodies [that] provide important functions that have significant economic value...[which include] protecting and enhancing water quality [and] providing fish and game habitat. Water bodies, such as rivers and lakes, provide flood control and clean drinking water by storing runoff from stormwater, retaining sediment, and recharging groundwater. They support livelihoods through irrigation for crops and drinking water for livestock and create opportunities for recreation and tourism."

The Shattuck-Holmes parcel permanently protects a buffer of riparian and upland forests along approximately 1,200 feet of the South Branch, while the Murphy easement protects 1,240 feet in the same general area. Heavily forested riparian buffers impede runoff, lower flood risk, absorb nutrients and toxins, stabilize banks, decrease erosion, shade, and cool stream water. A NH statute designates the South Branch of the Piscataquog River as a protected "natural river." This section of river is also listed as Wild Eastern Brook Trout Habitat. Much of these river-side lands are classified as the highest ranked

**Economic Value** Continued on page 4

## A Walk in the Woods: Miller Family Forest

For as long as I can remember I've enjoyed wandering around in the woods. Not just hiking through it along a trail to get from point A to point B, but wandering, listening, smelling, and exploring the forest with all the senses.

Little did I know that I was participating in what is now referred to as 'forest bathing.' Author Qing Li describes why I may relish this activity. He writes "The sounds of the forest, the scent of the trees, the sunlight playing through the leaves, the fresh, clean air—these things give us a sense of comfort. They ease our stress



The bridge over Collins Brook in the Miller Family Forest.

and worry, help us to relax and to think more clearly. Being in nature can restore our mood, give us back our energy and vitality, refresh and rejuvenate us." It sounds like the perfect prescription for relieving the stress of our current situation.

Over years of wandering, I've found myself looking forward to certain places in the woods, setting them as destination points or places to linger awhile. Sometimes these places promised a spectacular view, sometimes the possibility of wildlife encounters, but more often than not they were just places in the woods that felt good to me. A few of these spots are within the bloc of conserved properties at the north end of town that can be accessed from Old County Road North or the 2nd NH Turnpike North via the Dorothy & Herman C. Miller Family Memorial Forest or the Dinsmore Brook Conservation Area.

Starting at the kiosk for the Miller Family Forest on Old County Road North, an old logging road winds for a few hundred yards down to Collins Brook, a sizable rivulet. Fortunately, there is a bridge to facilitate crossing. The bridge itself has a bit of history. It was built with the help of many volunteer hands only to be washed downstream some 500 feet in the fall of 2017. Again with the help of many volunteers, it has been returned to its proper location and provides access to the hiking trail and bulk of the Miller Family Forest.

The trail is marked by blue rectangles stapled to trees and meanders uphill through a bony landscape populated with hemlock and pine.

It then sidles along the southern boundary of the property, crosses the western boundary, and follows the contour of the hill through some small trees and blueberry ledges before descending to Dinsmore Brook.

You've now accessed the ski/snowmobile trails of DBCA! A few of my favorite spots

> are up the trail to the left, and then left again, down to an old beaver dam overlooking a rather large meadow. If you're up for a little exploring, cross the stream at the dam and continue south, where you'll rejoin the main branch of Dinsmore Brook.

From the dam, retrace your route to

the main trail, continue west until you come to a loop trail, which leads down to another view of the same meadow. Returning to the main trail after completing the loop, look for a trail almost immediately on your right. This trail, a parallel trail just south of it, and the main trail, all lead toward the Crotched Mountain Golf Club at the intersection of Schoolhouse Road and the Turnpike North.

You can create your own loop routes, take a break with a take-out beverage or meal at the Toll Booth Tavern, extend your outing following the stream through the Collins Brook Headwaters property, or head back to Old County Road North—depending on your degree of hunger, thirst, energy or adventurousness.

Returning to Old County Road North, you may choose to go back over the hill through the Miller Family Forest, or follow Dinsmore Brook north to one of my favorite spots, just north of the trail intersection where the trail follows the brook at the base of a large rock outcrop. On a recent visit there was much evidence along the trail of the presence of some industrious beavers. This trail will lead back out to Old County Road North about a half mile north of where we started. (Be careful not to follow the snowmobile trail across Dinsmore Brook... *Who knows where that goes!*)

Use the directions and trail maps at the FLT website to find your spot, take a luxurious, restorative forest bath, and tell us about it!

Larry Ames

Visit: http://www.francestownlandtrust.org/ maps---directions.html

## Francestown Land Trust, Inc. **Board of Directors**

Larry Ames, Chair Isames@worldpath.net 547-8809

Betsy Hardwick, Vice Chair blhardwick1@hotmail.com 547-8773

**Greg Neilley, Treasurer** neilley@comcast.net 547-2856

Kevin Pobst, Secretary kmpobst@gmail.com 603-933-2636

Barry Wicklow, Director bwicklow@anselm.edu 547-9904

Ben Haubrich, Director bph03043@gmail.com 547-2075

Ted Graham, Director graham.ted@gmail.com 547-2548

Hannah Proctor, Director hgproctor@gmail.com 547-2816

Paul Lawrence, Director janeandpaul@gmail.com 547-2138

Francestown Land Trust, Inc. PO Box 132 Francestown NH 03043

francestownlandtrust.org info@ francestownlandtrust.org



Founded in 1986

# A Letter from the Chair

# **April 19, 2020**

Dear Friends and Neighbors of the Francestown Land Trust,

As I write this many of us are self-isolating and social distancing, leaving home only for essential tasks and grocery shopping. Thankfully, most of us live in rural communities that have escaped the brunt of the corona virus pandemic and its associated disease COVID-19.

Unfortunately, all of us have been af-

fected. Whether it be substantial changes in our daily living, the shortage of certain essential products, loss or diminished income, or, most regrettably, the loss of a loved one, it has touched us all in some way.

At the FLT, we started discussing themes for this Spring Newsletter long before the pandemic became part of our daily reality. Ideas included "the value of open space" and "why we do what we do." Now, the importance of open space and public access for recreation and reflection has become most evident.

I've noticed an unusual amount of activity at various trailheads about town, and I don't think it's just the Spring weather. It's also because a walk in the woods is the ideal way to combine getting out of the house, working your body, and maintaining proper social distance!

Since our last newsletter, the FLT has made some exciting additions to our conserved lands that highlight the benefits of preserving

open space. In late December, we closed on our first-ever Agricultural Land Easement, using the USDA Natural Resources Conservation Service (NRCS) program to help protect Abbottville Farm. Also in late December, we accepted generous donations of conservation easements from Jim and Cindy St. Jean and Michael and Mary Murphy. The St. Jean easement features important wildlife habitat and connectivity, as well as recreational value. The Murphy easement, combined with another recent purchase of land, protects riparian habitat and water quality along the Piscataquog River.

While the pandemic is disrupting our scheduled Spring activities, including a Joan Hanchett Nature Series lecture with Sam Jaffe of The Caterpillar Lab and the ninth annual New Hampshire Land Conservation Conference: Saving Special Places, it has led the FLT Board to develop new technical skill sets. Now we hold meetings online using Zoom—and some of us are exploring new software applications for managing our conserved lands.

Meanwhile, Spring is returning to the Monadnock region with choruses of wood frogs and peepers. Fruit buds are swelling. The grey pollen that the bees are bringing back to the beehive tells me that somewhere pussy willows are blooming. Rhubarb and garlic are emerging from their winter sleep. Bears are hungry and roaming. (I should bring those feeders in, but the birds provide so much enjoyment.) All are signs of resilience and renewal, reminding us that we will get through this time, just as we manage to get through our long New Hampshire winters.

We hope you are staying healthy and finding ways to get out and enjoy our open spaces. Thank you for helping to conserve these vital resources.

Larry Ames, Chair of the Francestown Land Trust

# Hawks: The question of size

Although the largest animal that has ever lived is the female Blue Whale, in most species of birds and mammals, males are larger than their mates—perhaps due to the greater success of larger males in competing for females. In birds of prey, however, this pattern is reversed: females tend to dwarf males. Biologists have attempted to explain this "reverse size difference" in birds of prey by studying behavior patterns, sex role differences, and ecology of hawks and other raptors. Here are some possible explanations.

Smaller males are safer mating partners. In most bird species, males offer potential mates food morsels during courtship. In birds of prey, sharp bills and talons make this kind of courtship a potentially dangerous affair and so, the argument goes, females that consistently choose smaller mates are better protected and therefore survive to produce more offspring. (It



A drawing from Barry Wicklow's sketchbook.

doesn't, however, explain why smaller males are not harmed by the sharp talons of heavier females).

Another idea involves the reproductive advantages gained by larger-sized females. A large female may produce more eggs per clutch and accumulate greater stores of fat and protein to sustain her through incubation and brooding. During this period, the female withdraws from the risks associated with "the chase and kill," often remaining motionless on the nest

for long periods. A larger female can also be a more formidable nest defender. Meanwhile, the male hunts for his mate. chicks, and himself. But why should this make him smaller than his mate?

Here's where the kind of prey taken by the hawk becomes important. The late Tom Cade, a Cornell ornithology professor renowned for his effort to conserve Peregrine Falcons, offered this theory: For bird-eating hawks, smaller bird species are more abundant prey than larger bird species. Smaller birds, however, are more agile, and thus more difficult to capture, than larger birds. So, it would be advantageous for male hawks to match the body size of the prey species as closely as possible, and thereby come closer to prey agility during the chase.

As it turns out, the faster and more agile the prey species, the greater the reverse male-female size difference of the raptor that feeds on it. The size differences are greatest in bird-eating hawks—then de-

**Hawks** Continued on page 5

2 • FLT Spring 2020 FLT Spring 2020 • 3 **Economic Value** *Continued from page 1* habitat in NH, as defined by the NH Wildlife Action Plan. Currently, the water quality in this section of the South Branch is excellent.

## **Recreation Land Protection**

Outdoor recreation and scenic tourism are key components of New Hampshire's economy. The TPL study establishes outdoor recreation as one of the top reasons that both new residents and visitors come to New Hampshire.

The FLT is committed to protecting habitat that is accounted for in the TPL study's economic added-value calculations. Key habitat supports viable populations of fish, game, and other wildlife species and provides opportunities for wildlife watching, fishing, and hunting. Over half of New Hampshire residents participate in wildlife-associated recreation. The TPL study points out that ready access to open space has been shown to produce a 48% increase in the frequency of physical activity.

In December 2019, the FLT finalized the St. Jean Conservation Easement, which protects 33.5 acres of woodlands and over 3,000 feet of scenic frontage along Bennington Road (Route 47). Jim and Cindy St. Jean purchased the land with the idea of conserving it from development and ensuring access for outdoor recreational use, including mountain biking. The property is adjacent to the recently re-named Fisher Hill Town Forest, managed by the Francestown Conservation Commission, that has also been identified as a potential candidate for recreational use. The St. Jean Easement ensures that this scenic and historic property will remain preserved and open for recreational use for future generations.

"The thought of seeing that historic and critical property developed would just break my heart," says Jim St. Jean about his motivations for the easement. "That property is so visible to everyone in town, and so critical to the green corridor and trail network, we felt it was the perfect candidate to protect. We are very thankful to the sellers and FLT for their flexibility and efforts in making this all come together on a short timeline."

The property enhances the "green corridor," connecting large blocks of forestland in the Crotched Mountain area and those to the north surrounding Shattuck Pond. This corridor is beneficial to recreational users as well as wildlife. Trails on the St. Jean parcel link to other recreational trails, maintaining a regional trail connection between Francestown, Weare, Deering, and Greenfield.

In addition to scenic beauty, the easement also protects three historic cellar holes and an unused section of the Old 2nd New Hampshire Turnpike. The 2nd NH Turnpike, completed in 1801, was a critical connecting route between Boston and Vermont; for decades after it was built, a large volume of traffic and trade passed over the road. Adjacent to one of the cellar holes is "Signature Rock," a slab of granite where early settlers carved their names.

#### **Agricultural Land Protection**

The TPL study also shows how land conservation contributes to the state's agriculture industry by helping to keep farms in active production. Most agricultural production in NH takes place on small farms, with the top four types being dairy, market gardens, apple orchards, and cattle raising.

In December of 2019, FLT purchased a conservation easement for "Abbottville Farm." The easement protects 40 acres of agricultural fields and adjacent forest visible along the 2nd New Hampshire Turnpike in the south side of town. The Robert Abbott property is one of a few parcels with "prime agricultural soil" in the Francestown area that remains in active agricultural use. Active farms such as Abbott's are vanishing in the region abutting the Second NH Turnpike.

Robert Abbott decided to arrange the easement with FLT after a developer approached him about buying the land. "He made me a sizable offer," he said. "I got to thinking about it, I said this is not what I want." Abbott said he didn't want to see a bunch of condominiums or a development going in. "I think it was the right thing for the town and myself."

The easement allows Abbott to continue to farm the land. Abbott keeps the 17 acres of pasture in the overall parcel fertile, so that his brother Donnie can raise beef cattle. The land has been used by Abbott's family for more than 100 years; it supported his grandfather's large dairy herd.

Protecting the parcel preserves a rural vista when entering Francestown from the more heavily developed south and east. This is a goal that Francestown residents say they value, as documented in the Francestown Conservation Plan, compiled in 2013. The property is contiguous with more than 800 acres of conservation land.

## **Development Can Be Expensive**

Land conservation also saves New Hampshire communities money through avoided

costs on expensive infrastructure and other municipal services required by residential property owners, such roads, schools, police, and fire protection. Studies have consistently shown that open spaces and working agricultural lands contribute more in taxes than they receive in municipal services. Residential properties, on the other hand, require more in infrastructure and services than they pay in taxes, representing a net loss to local governments. The national median, established in a study of 151 communities over 25 years, shows that for every \$1 paid in local taxes, working lands and open space require only \$0.35 in services, while the average home requires \$1.16 in services. Studies of 11 New Hampshire communities compiled by the American Farmland Trust found that open spaces and working farms and forests require, on average, only \$0.56 in services for every \$1 paid in taxes, while residential lands require an average of \$1.12 in services.

### Business and Industry Embrace Our Stewardship Goals

The Business and Industry Association (BIA) of New Hampshire's Strategic Economic Plan includes as one of its nine goals that the state "value, steward, and enhance its natural, cultural, and historic resources, making them available for current and long-term public benefit to foster vibrant communities, engaged citizens, and economic vitality." They further assert that it is important for New Hampshire to "develop and maintain an attractive and sustainable natural environment." Employees want to live in a place that is healthy, offers outdoor recreation, and is vibrant and livable. Employers want employees who are healthy and stimulated at work and at home.

#### **Quality of Life**

New Hampshire was recently ranked as the third "most livable state" by CQ Press. Clean air, forested mountains, and healthy lakes and rivers all contribute to the high quality of life. A University of New Hampshire study found that environmental quality-of-life issues matter to New Hampshire residents, the most important issues being clean water, scenic values of forests and farms, and outdoor recreation.

Paul Lawrence and Kevin Pobst

For more information, go to: https://www.tpl.org/nh-roi-report

Hawks Continued from page 3 crease progressively in hawks that feed on ever less agile mammals, fish, slow-moving invertebrates, and, finally, carrion—with little size difference between male and female vultures.

For example, in Northern Goshawks and Peregrine Falcons—both bird-eating hawks—males are about 64% the weight of the female, whereas in Red-tailed Hawks—primarily mammal predators—males are about 84% the weight of the female. In Ospreys and Snail Kites, males are about 90% the weight of their mates.

The Sharp-shinned hawk, our smallest North American bird-eating hawk, also shows a large male-female size difference with the male at just 57% the weight of the female. I watched a male sharp-shinned hawk chase a chickadee around and around a small hemlock. The sound the hawk's wings as it coursed back and forth were like the sound of taking a rope and whipping it above your head. (Try this rope sound to get the chickens to go to their coop!)

A large male-female size difference may also reduce competition between mates by partitioning food sources, allowing each to feed on different size prey species. I also watched a female sharpshinned hawk take down a mourning dove, pluck it, then begin feeding.

The reproductive advantages gained by larger females together with the hunting advantage gained by smaller males provide an intriguing explanation for the mystery of size in hawks.

Enjoy your hawk watching!

Barry Wicklow

# Thank you to all our previous year's Donors

The Francestown Land Trust is dependent upon, and deeply appreciative of, community support. Whether you are a Francestown resident, a neighbor in the region, or you just have a special place in your heart for our town and its wild places, we would like to express our gratitude to all who have supported us during this past year:

Katherine W. Allen Meredeth & Leonard Allen Brewster & Elizabeth Ames Larry Ames & Jay Hale Abigail Arnold, *In Memory of* Rav Wallace Pamela Avery Judith Badot & Ron Cheney Vicki Baggia Ron & Moe Baptiste Robyn & Michael Beisang Benevity Community Impact Fund Gerri Bernstein & Philip Sadler David & Patricia Blake James & Eleanor Bosman **Jeff & Paula Briggs** Stewart & Carol Brock Herb Bromberg Bradley Brown, In Memory of Constance Clark Varnum Neal & Agneta Brown Tim & Dianne Buirge David Butler Kathy Byrne Meade Cadot & Sandy Taylor Robert & Mary Frances Carey Dorna Caskie, In Memory of Constance Clark Varnum Roger Cawley Miriam & Fillmore Clark Timothy & Amy Coffin Elizabeth Grace & Mark Couturier Janine & David Cowell Sara Cox & Jeff Gorton Richard Crawford Henry & Martha Cruciani Leslie & Lee Davis Heidi Dawidoff Patricia Dewey & John Foster, *In Memory of Ray Wallace* Marsha Dixon Amber Durost & Eric Bergeron Richard & Lorraine Edmunds Peter & Mary Eppig Tim & Mary Feltz John Ferranti Ann & Bill Forbush Mary Alice Fullerton

Barbara Gannon

Kevin & Madeleine Gordon

Jack & JoAnn Gorrie, In Mem-

orv of Constance Clark Varnum

Marian LoFland Gould, In Honor of Martine Villalard-Bohnsack Pat & Van Gould, In Memory of Constance Clark Varnum Ted & Marcy Graham Eric Grenier & Meri-Lvn Worthen Lisa Federico & Jim Hamilton Betsy Hardwick & Jeff Tarr Ben & Robin Haubrich Laurence & Laura Hawkins **Janet Hicks** Isabella Britain Hill, In Memory of Constance Clark Varnum Tom Hoey Hall Hoover Ken & Cecily Houston **Brad & Bridget Howell** Paula Hunter & Joe Valentine Jerry Johns David & Susannah Ionas John Kerrick Larry & Barbara Laber Rodnev C. Lamon Vinoy & Carol Laughner Elizabeth & Ralph Lavallee Iane & Paul Lawrence Vicki Leandri Matthew & Stephanie Lee Paul & Mary Lee, In Memory of Constance Clark Varnum Jeff & Barbara Levis Bob & Linda Lindgren, In Memory of Ray Wallace Chris Linell & Paula Eder Silas Little &

Theresa Kirouac-Little David & Ann Luther Holly MacAdam Kelly & Paul Marshall Chester Masel Ellie Miles & William McAulev Elspeth Miles Donald & Martha McGinley David & Janice McKenzie Thomas & Margaret Merrow Ann Montgomery Iim & Sue Morash Michael & Mary Murphy Pat Nelson Diane & Neil Noonan Veda O'Neill Rick Oriel Ken & Cheryl Paradis

Pawtuckaway Piecers Quilt Guild, In Memory of Constance Clark Varnum Sheldon Pennover & Penelope Beal Mark & Shirley Pitman Hannah Proctor Michael Putnam & Kenneth Gaulin, In Memory of Constance Clark Varnum Richard & Carol Reed Dennis & Eileen Rodier Christopher & Deborah Rogers Richard & Paulett Sanders Derek Sanger & Samantha Clark Ruth Schmitz Gary Schnakenberg & Rebecca Martusewicz Robert C. Seamans III Don & Kay Severance Elizabeth Shannon Richard & Jody Simpson Michael Skolones & Adrienne Spindler Jacqueline Smethurst & David Drinkwater Caldwell Smith & Alice Benedict Robert & Johanna Staub John & Cathi Steiger Steve's School Bus Service Robert Stiratelli Roger Swain Patricia Swan Rolf Tallberg Ben & Kate Taylor David Taylor Karen & Dan Tavlor Ed & Joan Tiffany Lena & Roger Trancik William & Bessann Triplett Christine & Thomas Tyrie Martine Villalard-Bohnsack & Chuck Bohnsack Francie VonMertens Tom & Alice Welden Richard & Candace Wharton David Whipple Barry & Lois Wicklow Fred & Marie Williams Lisa Wilsher & Steve Chamberlin Andrea & Thomas Wing Robert & Patricia Zeamans George & Pat Zink Judith Zivic, In Memory of Constance Clark Varnum

4 • FLT Spring 2020 • 5



PRST NON-PROFIT ORG US POSTAGE PAID FRANCESTOWN NH PERMIT NO. 9

**Return Service Requested** 

# Zoom into the FLT Annual Meeting on June 11, 2020 at 6pm

Due to the uncertainty caused by the novel corona virus and its associated disease COVID-19, as well as what recommendations for social distancing measures may still be in place, the FLT board of directors has decided to conduct the 2020 Francestown Land Trust Annual Meeting virtually via Zoom.

The meeting will take place at 6:00PM on Thursday June 11, 2020.

Members will be sent an email invite so that they may participate. If you are a member (i.e., donated in the past year) and want to participate, but are not sure that we have your email on file, contact us at info@francestownlandtrust.org and we'll get you on the list.

This will be a business meeting only, to report to our members and elect a slate of directors. This process typically takes 20-30 minutes.

Our scheduled speaker, Susie Spikol, outreach educator at the Harris Center for Conservation Education, was to have spoken about her life as a wanna-be otter "Since I Couldn't Be an Otter, I became a Naturalist." We are looking forward to having her join us at our annual meeting next year. Susie's passion for the subject is revealed in her writing:

"I have been lucky—or maybe just persistent. I've seen otters and each time I do, I am breathless with the experience. Once I was even lucky enough to be paddling in Northern New Hampshire and

encounter a mother with her three otter pups. I watched them watch me as they bobbed and chortled not far from my canoe with their bright eyes taking me in. And once, when I was out tracking in Nelson along a fresh otter trail, I watched the otter up ahead of me run and slide across the lake. I'll never forget how I could smell its musky fragrance long after it disappeared down into a hole in the frozen lake's edge, still wishing I could follow it. "

Meanwhile, we can all benefit by emulating otters and connecting with our playful side.

